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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/701,069	11/27/2000	Ari Becks	BP100710	7165

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EXAMINER	
PIERRE, MYRIAM	

ART UNIT	PAPER NUMBER
2654	7

DATE MAILED: 09/10/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/701,069	BECKS ET AL.	
	Examiner	Art Unit	
	Myriam Pierre	2654	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE ____ MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☐ Responsive to communication(s) filed on _____.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-15* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-15* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *27 November 2000* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date *05/14/2001*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

1. Claim 1-12, and 14-15 are rejected under 35 U.S.C. 102(b) as being unpatentable over Franz et al. (EP 805403 A2).

As to claim 1, Franz teaches

Identifying a structural segment in the character string of said first language following a first rule **(Sentence structure is structural segment of a sentence, character words (or strings) of first language, uses first rule (dividing/division pattern) 1st language divided into syntax units or sentence structure, page 2, line 23, page 5, lines 22-26, and page 7, lines 4-7 and 11)**;

comparing identified structural segment with model segments in the form of character strings in the first language stored according to a second rule **(Sentence structural is structural segment, model segment are examples that are stored in memory of translations, character strings or character words, second rule (detecting collation of 1st language to examples that are stored**

as phrase units), page 5, lines 27-32, page 8, lines 54 and 56, and page 9 lines 43 and 46);

select one model segment on the basis of said comparison **(Model segments are examples stored in memory, "translating means" chooses/selects the best example or model segment that best fits 1st language, page 5, lines 27-32);**

reading a model in the form of a character string in the second language logically connected to the selected model segment **(Example or model, recognizes/reads character words in second language to connect best matched examples, or model segment, page 5, lines 31-32);**

translating structural segment into translation segment in the form of a character string in the second language on the basis of said equivalent segment and a third rule **(Translating means translates sentence structure, or structural segment, into translation segment, or syntax units, from character words (strings) in second language, and third rule or clause pattern syntax, calculations to find 'example' corresponding to the 1st language matches 2nd language, page 5, lines 38-42, and page 9, lines 16 and 18);**

identification of an intermediate word and/or a suffix and said first rule is essentially based on the identification of intermediate word and/or suffix **(Syntax analyzing processing part are parts of speech that uses morpheme information – suffix or parts of words- and first rule (dividing), page 7, lines 51-52 and page 5, lines 22-26).**

As to claim 2, Franz teaches

information to be given as a character string in the second language is generated basis of translation segments and a fourth rule **(Fourth rule, probability of translated examples that match first or original language, page 5, lines 47-51)**.

As to claim 3, Franz teaches

when no model segment to be selected following the second rule is found as a result of the comparison of the structural segments, the structural segment is displayed by means of a user interface and the equivalent segment o the display structural segment is stored in the knowledge base by means of the user interface **(No example found, following second rule, collating syntax, stored in translation example memory, outputs into dividing part (deals with structural segment of sentence) using apparatus that displays text, data is analyzed using knowledge and rules, page 6, lines 26-27, lines 48-50 and page 2, line 34).**

As to claim 4, Franz teaches

structural segment comprises of a punctuation mark **(See Fig 9C and page 26, line 12)**.

As to claim 5, Franz teaches

type identifier of the model segment is stored in logical connection with the model

segment **(Uses "converting part" as a type identifier, which will select which kind of model or 'example' that is matched with 1st language input page 3, lines 18-20)**.

As to claim 6, Franz teaches,

there are two model segments representing different languages logically connected to each other **(Two model segments, examples and grammar used to find translation, both of those model segments use probability to match both languages, page 5 lines 51-53)**.

As to claim 7, Franz teaches

rules updated on the basis on output data from the user interface **(Translation rules from input data, page 2, lines 25 and 33)**.

Claim 8 recites the same or similar limitations as claim 7, rejected above, and so claim 8 is rejected for the same reason above.

As to claim 9, Franz teaches,

reading the first information given as a character string in the first language **(First language character recognized, page 2, line 23);**

translating the fist information given as a character string in said first language on the basis of data in the knowledge base into first information given as a character

string in the second language to the extend allowed by the data available in the knowledge base **(First language sentence, character recognition, and second language having 1st language sentence translated based on knowledge and rule based on second language or translated language, page 2, lines 32-33)**;

determining the additional data needed to complete the translation of the first information given as a character string in the first language into first information in the form of the character string in the second language **(Searches examples to determine if there is match between the first language and the second language sentence (character words), page 2, line 44)**;

feeding said additional data in the knowledge base to update the knowledge base **(Examples, which are in second language, are stored if not found in memory, the 'examples' are feed into knowledge base or memory, page 2, lines 48-50 and 59)**;

completing the translation of the first information given as a character string in the first language into first information given as a character string in the second language **(Converting part supplies translation from search of unchanged words already found in memory, which is the first information, to output as second language, page 3, lines 3-4)**,

storing said first information given in the second language **(Store unchanged parts to translated word, page 2, lines 42-42 and 59)**;

translating the second information given as character string in the first language into

second information given as a character string in the second language on the basis of said update data in the knowledge base **(Second information, or examples (or thesaurus) that matches first language, is stored in knowledge base or memory, page 2, lines 5-6, 18-20).**

As to claim 10, Franz teaches,

knowledge base means for storing model segments in the form of character strings in said first language, and in logical connection with these, equivalent segments in the form of character strings in the second language, and for storing a first, second, and third rule **(Store parameters of 'example' or model segment, and matching it to stored second language, if not found, a probability of the word is performed and the new 'example' is stored in memory, page 2 line 42 and page 5, lines 49-50).**

The rest of the limitations of claim 10 are rejected for the reasons in rejecting claim 1.

Claim 11 recites the same or similar limitations as claim 2, rejected above, and so claim 11 is rejected for the same reasons.

As to claim 12, Franz teaches,

user interface means for connecting the user to said knowledge base means **(text data**

is outputted, and uses knowledge base, page 2, line 21 and page 2, lines 26-27).

As to claim 14, Franz teaches,

a first knowledge base and a second knowledge base so that specific users have access to first knowledge base means and only some of specific uses have access to second knowledge base means **(first knowledge base is memory and second knowledge base is the thesaurus, user is able to find out the words which are in memory, but can access the thesaurus if necessary, page 7, lines 46-47 and page 8 lines 26-27).**

As to claim 15, Franz teaches,

a first knowledge base means and a second knowledge base means, selective transfer of data stored in said knowledge base to first knowledge base **(first language, not necessary to store examples of all possible first sentences, the system is selective in what is stored, page 3, lines 41-45).**

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

3. Claim 13 is rejected under 35 U.S.C. 103(a) as being unpatentable over Franz (EP 805403 A2), as applied to claim 10, in further view of Brown et al. (5,768,603).

As to claim 13, Franz teaches forming character strings in the second language, and for storing a first, second, and third rule **(Storage is done for translating part, or second language with the following rules: first rule is division pattern, second rule is phrase translation, and third rule is clause pattern, page 7, lines 4-5, and 11, and page 9, lines 16, 43, and 45)**.

Franz does not teach that user interface means are connected to a knowledge base means over a data transmission network.

However, Brown teaches a user interface means are connected to a knowledge base means over a data transmission network **(User interact with translation device and receive document from translation system, then send the translation out on the external network, uses source transducers (stores source sentence in memory) as knowledge base, column 12, line 24-31 and column 13, lines 28-34)**.

It would have been *prima facie* obvious to one of ordinary skill in the art at the time the invention was made to use character strings from the first, second, and third rules for storing and applying a user interface means that connects a knowledge base over data transmission network to extend user capacity to control the knowledge base or device.

Conclusion

1. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure as follows:

Nosohara (5,956,740) teaches user has control over processing steps in key word translation, processing steps is interchangeable, flexible systems.

Datig (6,233,546) teaches universal translation system and apparatus.

Dean et al. (4,123,795) teaches logical structure for command control.

Brown et al. (5,293,584) teaches word segment models for speech language translation.

Fuji (6,516,296) teaches processing original text as character strings for language translation.

Amith (6,363,337) teaches translating words as character strings and decomposes data elements as a translation process.

Ecker et al. (6,442,524) teaches rule based method and structural analysis for translation system.

Lewin (6,556,973) teaches logical format for data models that are used in grammatical structure of phrase formats.

2. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Myriam Pierre whose telephone number is 703-605-1196. The examiner can normally be reached on Monday – Friday from 5:30 a.m. - 2:00p.m.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Talivaldis Smits can be reached on 703-306-3011. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information As to the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

MP

08/23/2004

RICHEMOND DORVIL
SUPERVISORY PATENT EXAMINER